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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
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Yasuyuki Nomizu

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OBLON, SPIVAK, MCCLELLAND MAIER & NEUSTADT, P.C.
1940 DUKE STREET
ALEXANDRIA, VA 22314

EXAMINER

HUNG, YUBIN

ART UNIT

PAPER NUMBER

2624

NOTIFICATION DATE

DELIVERY MODE

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ELECTRONIC

Please find below and/or attached an Office communication concerning this application or proceeding.

The time period for reply, if any, is set in the attached communication.

Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

patentdocket@oblon.com
oblonpat@oblon.com
jgardner@oblon.com

Office Action Summary	Application No. 10/797,129	Applicant(s) NOMIZU, YASUYUKI	
	Examiner YUBIN HUNG	Art Unit 2624	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 24 June 2008 and 10 July 2008.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1,2,4-15 and 20-31 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1,2,4-15 and 20-31 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 10 July 2008 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some * c) ☐ None of:
1. ☐ Certified copies of the priority documents have been received.
 2. ☐ Certified copies of the priority documents have been received in Application No. _____.
 3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|--|---|
| 1) <input type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413) |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | Paper No(s)/Mail Date. _____ |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO/SB/08) | 5) <input type="checkbox"/> Notice of Informal Patent Application |
| Paper No(s)/Mail Date <u>7/11/08</u> . | 6) <input type="checkbox"/> Other: _____ |

Continued Examination Under 37 CFR 1.114

1. A request for continued examination under 37 CFR 1.114, including the fee set forth in 37 CFR 1.17(e), was filed in this application after final rejection. Since this application is eligible for continued examination under 37 CFR 1.114, and the fee set forth in 37 CFR 1.17(e) has been timely paid, the finality of the previous Office action has been withdrawn pursuant to 37 CFR 1.114.

Applicant's submission filed on 06/24/08 has been entered.

2. Applicant's supplemental amendment filed on 07/10/08 has been entered.

3. In view of Applicant's amendment, the objection to the specification has been withdrawn.

4. In view of Applicant's amendment, the 35 USC § 112 (both first paragraph and second paragraph) rejections have been withdrawn.

5. [Note that the following discussions make reference to the 07/10/08 supplemental amendment which, *inter alia*, includes additional amendment to the claims.]

Regarding amended claim 1 (and similarly amended independent claims 7, 12, 20 and 24), Applicant argues (see PP. 16-18, especially P. 17, paragraphs

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2 and 3) that Delean (previously applied to the rejection of canceled claim 5) fails to teach or suggest the new limitation (that is, the determining unit).

However, this argument is not persuasive because Delean discloses having the FITS RIP routine, which carries out the editing/modifications stored in an FITS file, resides within a client apparatus [Figs. 3 (considered a client apparatus) & 4, especially refs. 118 & 212 and corresponding descriptions in the specification] and/or within an external apparatus [Col. 7, lines 60-64; the image display device such as a printer is considered an external apparatus]. Therefore a determination needs to be made as to where the editing/modifications should be performed.

Claim Rejections - 35 USC § 103

(applied to the claims of the 07/10/08 supplemental amendment)

6. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

7. Claims 1, 2, 4-15 and 20-30 are rejected under 35 U.S.C. 103(a) as being unpatentable over Hatae et al. (US 2003/0193948), and further in view of

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Fukuhara et al. (US 7,127,111), Long (US 5,768,424) and Delean (US 5,907,640).

8. Regarding claim 1, and similarly claims 20 and 24, Hatae discloses a client apparatus connected with a communication network [Fig. 2, ref. 28; paragraphs 100-113] including

- a storage unit
[Fig. 2: refs. 38 & 40; P. 4, paragraph 95, lines 16-20]
- a transmission unit configured to transmit either the reversible or non-reversible code, or an image obtained from decoding the reversible code or non-reversible code, to a predetermined transmission destination
[Fig. 2, ref. 44 (transmitter); P. 4, paragraph 95, lines 23-25; P. 5, paragraph 113]
- a selecting unit configured to selectively perform transmission of the non-reversible code or the reversible code, or an image obtained from decoding the reversible code or non-reversible code
[Fig. 2, refs. 38-42; P. 4, paragraph 95, lines 16-21; P. 5, paragraph 112, lines 1-4]

While Hatae also discloses a coding unit [Fig. 2, ref. 36], it does not expressly disclose

- (that the stored code) is obtained by reversibly compressing and coding an original image according to a predetermined coding algorithm having a hierarchy configuration from a reversible unit through a non-reversible unit
- an altering unit configured to generate, from the reversible code, a non-reversible code

However, Fukuhara discloses generating reversibly compressed code in the manner recited above using JPEG 2000 [Fig. 1; Col. 4, line 26-Col. 7, line 56] and Long further discloses generating non-reversible code from the code [Fig. 7, refs. 23 & 24 (generating non-reversible code); Fig. 10 (detailing the process of Fig. 7, ref. 24); Col. 4, lines 25-55].

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Additionally, per the discussion in paragraph 6 above, Delean teaches

- an editing unit configured to perform an editing operation on a non-reversible code image obtained from decoding the non-reversible code, to store the editing operation, and to reflect the editing operation on the reversible code
 [Perform editing operation: Fig. 4, ref. 208; Col. 7, lines 19-32 (note that the editing is applied to the image in the IVUE file, either full or compressed); Col. 9, lines 34-56, especially lines 54-56 (note that since the editing is applied to the image, the lossily, or non-reversibly, compressed image necessarily needs to be decompressed first, i.e., to obtain a "non-reversible code image").
 Store editing operation: Col. 7, lines 30-47 (note that the FITS file stores editing operations).
 Reflect editing operation: Fig. 4, ref. 212. Note that (1) Col. 7, lines 48-59 discloses that to produce a single output image the edit operation is applied to the original image (which can be obtained from a reversible code of that image, as per the definition of "reversible"); (2) Col. 9, lines 43-45 discloses that the original image can be losslessly (i.e., reversibly) compressed; and (3) Col. 9, lines 48-53 discloses the advantages of using a compressed file (namely to lower storage requirement and transmission time). Therefore it would have been obvious to apply editing operation to the reversible code because per (3) losslessly compressing the original image (to generate reversible code of the image) has several advantages and, as already indicated, the original image can be obtained from decoding the reversible code]
- a determining unit configured to determine whether contents of an operation of editing or modifying image data which are applied to the image data in a form of reversible code or the original image should be performed by the client apparatus or by another external apparatus
 [Figs. 3 (considered a client apparatus) & 4 (especially refs. 118 & 212) and Col. 5, line 56-Col. 7, line 59 (especially Col. 7, lines 48-59); Col. 7, lines 60-64 (the image display device such as a printer is considered an external apparatus)]

It would therefore have been obvious to one of ordinary skill in the art to modify Hatae with the teachings of Fukuhara, Long and Delean as recited above to obtain the invention as specified in claim 1. The reasons for doing so at least would have been to improve coding efficiency (Fukuhara: Col. 1, lines 36-41), to meet the minimum timing requirements of the output device such as printers or displays (Long: Abstract), as well as to be able to allow an output image to be exported to any one of many desktop publishing systems that are available and to give the ability to edit images that are resolution independent, among other thing, as Delean indicates in Col. 7, line 55-Col. 8, line 13.

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9. Regarding claim 2, and similarly claims 10, 15, 23 and 25, note that Fukuhara discloses the use of JPEG 2000 [Fig. 1].

10. Regarding claim 7, and similarly claim 12, per the analysis of claim 1, the combined invention of Hatae, Fukuhara, Long and Delean discloses a coding unit, a storage unit, an altering unit, an editing unit, a transmission unit, a selecting unit and a determining unit as recited.

In addition, Hatae further discloses

- a decoding unit decoding the reversible code [Fig. 2, ref. 36 (both compress, or expand what has been compressed, whether reversible or not)]
- a printer engine performing image formation on a medium based on the reversible code image [Fig. 2, ref. 60]

11. Regarding claim 11, note that Hatae further discloses an image input device [Fig. 2, ref. 30; P. 5, paragraph 106] that reads data to be compressed by the coding unit [Fig. 2, ref. 36].

12. Regarding claim 26, the combined invention does not expressly disclose the following:

- in said selectively performing transmission, the image data in a form of the non-reversible code is performed when, in the client apparatus, the image data is displayed with a use of the generated code transmitted, and therewith, operation of editing or modifying is performed on image data

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However, Delean teaches selecting lossily (i.e., non-reversibly) compressed for displaying and editing purpose [Fig. 4, refs. 204–208; Col. 7, lines 12-23; Col. 9, lines 54-56] and selecting image data that is not non-reversibly compressed for transmission to an external apparatus [Fig. 4, refs. 204, 214, 212 & 216; Col. 7, lines 48-59], as well as using lossless (i.e., reversible) compression [Col. 9, lines 34-337 & 43-45] and obtaining the highest quality image for the final output [Col. 9, lines 56-59] (these teach using reversible compression for the output file 216 since both high image quality and smaller file size are accomplished this way).

13. Regarding claim 4, and similarly claim 27, note that Delean further discloses

- the selecting unit is configured to transmit the reversible code having information indicating that contents of operation of editing or modifying the image data are attached thereto [Fig. 4, refs. 212 & 216; Col. 7, lines 48-59]

14. Regarding claim 5, and similarly claim 28, Delean further discloses

- the selecting unit, when a determination is made by said determining unit that the contents of operation of editing or modifying for the image data are actually reflected on the image data in the form of reversible code or the original image by another external apparatus, is configured to transmit the reversible code having information indicating that the contents of operation of editing or modifying the image data are attached thereto [Fig. 4, refs. 212 & 216; Col. 7, lines 48-59; also per the analysis of claim 3 regarding the use of reversible code. Note that the output image 216 contains editing/modifying information]

15. Regarding claim 6, and similarly claim 29, Delean further discloses

performing processing according to the received information indicating

editing/modifying operations [Fig. 4, refs. 212 & 216; Col. 7, lines 55-64. Note

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that an external desk publishing system, considered a server, will carry out the editing/modifying operations].

16. Regarding claim 8, and similarly claims 13 and 21, Delean further discloses

- transmits the image data in the form of reversible code when the image data in the form of the reversible code is provided to the printer engine
[Fig. 3, ref. 110; Fig. 4, ref. 212; Col. 5, lines 56-60; Col. 6, lines 10-12; Col. 7, lines 48-59 and Col. 9, lines 57-62]

17. Regarding claim 9, and similarly claims 14 and 22, Delean discloses sending non-reversible code to display [Fig. 3, especially ref. 108; Col. 3, lines 25-67; Col. 6, lines 8-12; Col. 7, lines 60-64 (external apparatus); Col. 9, lines 53-55 (sending non-reversible code)].

18. Claim 30 is similarly analyzed and rejected as per the analyses of claim 7 (regarding the decoding unit) and claim 1 (regarding the editing unit).

>>><<<

19. Claim 31 is rejected under 35 U.S.C. 103(a) as being unpatentable over Hatae et al. (US 2003/0193948), Fukuhara et al. (US 7,127,111), Long (US 5,768,424) and Delean (US 5,907,640) as applied to claims 1, 2, 4-15 and 20-30 above, and further in view of Engeldrum et al. (US 2002/0003903).

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20. Regarding claim 31, the combined invention of Hatae, Fukuhara, Long and Delean discloses all limitation of its parent claim 1 but not expressly the following

- a decoding unit configured to decode less than all of the reversible code
- the editing unit is configured to apply the editing operation to an image obtained from decoding the portion of the reversible code

However, Engeldrum discloses decoding only a part of a compressed image and editing only the decoded portion [Fig. 21, ref. 718 and paragraph 192, especially lines 4-7; note that Fukuhara discloses generating reversible code, per the analysis of claim 1; note also that color correction is a form of editing].

Therefore it would have been obvious to one of ordinary skill in the art at the time of the invention to modify the combined invention of Hatae, Fukuhara, Long and Delean with the teaching of Engeldrum as recited above to obtain the invention as specified in claim 31. The reason for doing so at least would have been to increase the speed of providing color corrected images to a user, as Engeldrum indicates in paragraph 192, lines 1-7.

Contact Information

21. Any inquiry concerning this communication or earlier communications from the examiner should be directed to YUBIN HUNG whose telephone number is (571)272-7451. The examiner can normally be reached on 7:30 - 4:00. If attempts to reach the examiner by telephone are unsuccessful, the examiner's

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supervisor, Matthew C. Bella can be reached on (571) 272-7778. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

22. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

Yubin Hung
Primary Examiner
Art Unit 2624

/Yubin Hung/
Primary Examiner, Art Unit 2624

July 29, 2008